

ABSTRACT

A reprogrammable metal-to-metal antifuse is disposed between two metal interconnect layers in an integrated circuit. A lower barrier layer is formed from Ti. A lower adhesion-promoting layer is disposed over the lower Ti barrier layer. An antifuse material layer selected from a group comprising at least one of amorphous carbon and amorphous carbon doped with at least one of hydrogen and fluorine is disposed over the lower adhesion-promoting layer. An upper adhesion-promoting layer is disposed over the antifuse material layer. An upper Ti barrier layer is disposed over the upper adhesion-promoting layer.